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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/586,557

09/14/2006

Morten Dahl

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NEW YORK, NY 10036-7311

EXAMINER

MAI, TIEN HUNG

ART UNIT

PAPER NUMBER

2836

MAIL DATE

DELIVERY MODE

09/14/2009

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/586,557	Applicant(s) DAHL ET AL.	
	Examiner TIEN MAI	Art Unit 2836	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 05 May 2009.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 10-17 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☒ Claim(s) 1-9 and 18 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 19 July 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. Application number 10/586557 for "Lightning Diverter for Conducting a Lightning-Induced Electrical Current and a Method of Producing the Same" filed 09/14/2006 has been examined. Upon response to Election/Restriction on 05/05/2009, applicant elects Group II.

Claim Objections

2. Claim 10; please change "said segments" in line 6 to "said isolated segments".

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 10 and 17 are rejected under 35 U.S.C. 102(b) as being anticipated by Brick (US 4,824,713, "Brick").

5. **Regarding claim 10**, Brick discloses lightning protected structural surface, the apparatus (fig. 3) comprising: a layer of electrically non-conductive material (17) with a plurality of isolated segments of electrically conductive material (22), wherein exposed parts of said isolated segments are concave shape.

6. **Regarding claim 17**, Brick discloses that the electrically non-conductive material being preferably made of an adhesive (col. 3, lines 43-45).

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. Claims 10-14, 16 and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cline (US 4,506,311, "Cline") in view of Brick.

9. **Regarding claim 10**, Cline discloses lightning diverter strip with diamond-shaped conducting segments, the apparatus (fig. 1-3) comprising: a layer of electrically non-conductive material (12) with a plurality of isolated segments of electrically conductive material (15) having a diamond shape.

10. Cline does not explicitly disclose exposed parts of said isolated segments are in concave shapes. In the same field of endeavor, Brick discloses a plurality of isolated segments of electrically conductive material (22), wherein exposed parts of the isolated segments are concave shapes (see fig. 3). This is viewed to be changed in shape, which is dependent upon the operating condition and design requirements. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention was made to choose the isolated segments to be concave shape, since it has been held that mere changing shape of the essential working parts of a device involves only routine skill in the art. *In re Dailey*, 357 F.2d 669, 149 USPQ 47 (CCPA 1966).

11. **Regarding claim 11**, Cline discloses the diverter being in the shape of a strip (see fig. 1).

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12. **Regarding claims 12 and 13**, Cline and Brick disclose the limitations as discussed above. Neither Cline nor Brick discloses the isolated segments having different shapes, i.e., cross or star shape. This is viewed to be changed in shape, which is dependent upon the operating condition and design requirements. Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention was made to choose the isolated segments to be concave shape, since it has been held that mere changing shape of the essential working parts of a device involves only routine skill in the art. *In re Dailey*, 357 F.2d 669, 149 USPQ 47 (CCPA 1966).

13. **Regarding claim 14**, Cline discloses the diverter having a layer of material (28) increasing the stiffness of the diverter in the direction along the strip (see fig. 3).

14. **Regarding claim 16**, Cline discloses that the isolated segments preferably makes of metal (col. 2, line 60 – col. 3, line 2).

15. **Regarding claim 17**, Cline discloses that the electrically non-conductive material being preferably made of an adhesive (col. 3, lines 19-24).

16. Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Cline in view of Brick, and further in view of Bocherens (US 5,841,066, “Bocherens”).

17. **Regarding claim 15**, Cline and Brick disclose the limitations as discussed above. Neither Cline nor Brick discloses the diverter comprising an outermost layer of double-sided adhesive tape. Bocherens discloses a lightning strip having self-adhesive type, i.e., double-side adhesive type, which one side sticks onto the lightning strip and the other side adheres onto application to be protected, i.e., radomes (col. 3, lines 55-

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60). It would have been obvious to one of ordinary skill in the art at the time of the invention was made to modify the device of Cline in view of Brick to include a self-adhesive tape, as taught by Bocherens, in order to replace and its maintenance is easier than other type of fastening (col. 3, lines 55-60).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to TIEN MAI whose telephone number is 571-270-1277. The examiner can normally be reached on M-Th: 8:00-7:00. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jared Fureman can be reached on 571-272-2391. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

/Tien Mai/
Examiner, Art Unit 2836

/Danny Nguyen/
Primary Examiner, Art Unit 2836